

Surgeons' Self-Esteem

A Change From Too High to Too Low?

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Surgeons in the Past

A common subject of discussion at both national and international meetings is the change in the position of surgeons. Retired colleagues remember "the good old days" when the status of the professor in surgery was unquestionable, not only in the surgical department and among the medical faculty but also within the hospital. Options for treating diseases were scarce, and often the possibility of performing some kind of surgery meant the difference between life and death for the patients. Since patients' lives were pretty much in the hands of surgeons, it was natural that surgery became the main medical profession. All surgeons were general surgeons, which meant that they had (or at least seemed to have) the skill to operate on any organ or tissue of the body. Surgeons were in charge not only of the treatment of patients but also of the whole department. Surgeons, therefore, were highly respected by the community and the patients they treated. They were the kings, and some even behaved accordingly.

These kingly attitudes spread easily from the heads of surgery to other surgeons in the department, who eagerly adopted a similar role to that of their chief. Fast decisions and fast operations were the fashion in those days, and slogans like "If in doubt, cut it out!" roared from OR to OR. The self-esteem of the surgeons was high, perhaps even too high.

Obviously this picture is a sketch of the surgical stereotype, but it was still a quite familiar one in many medical institutions not too long ago. Our colleagues in the more conservative specialties eventually reacted, and the qualities valued by the surgeons themselves were not only unvalued but dismissed. In the worst-case scenario, other colleagues saw surgeons as peculiar, self-willed butchers and labeled them as unintelligent, uncooperative, and despot.

Is this picture I have just presented true or merely an overstatement? For instance, the image of one who performs operations with speed is not just a cult image of a surgeon. It should be remembered that diagnostic tests for diseases were relatively scarce and, if available, took valuable time to

provide answers. Thus, especially in emergency situations, the tests were not as useful as they are today. For instance, abdominal surgeons quite frequently had to perform exploratory laparotomy on patients to find the cause of the disease and, eventually, a surgically treatable one. Often there was no other way. Furthermore, half a century ago anesthesia was still in its infancy and patients could not be managed safely during complicated and lengthy operations. Speed was really a surgical necessity in those days.

Surgeons of Today

Today the role of the surgeon has changed on many levels. Surgery is just one of numerous specialties, many of which have been introduced only during the last 20 years. And surgeons, no longer necessarily the ones in charge, must balance even greater demands than those posed by surgery itself.

Decision making has been taken over by politicians, administrators, and insurance companies. In a world of increasing healthcare costs, those who pay want to have control.¹ There are countries in which the insurance companies, not the surgeons, direct the number of postoperative days the patients may stay at hospitals. The number of patients operated upon seems much more important to the new healthcare controllers than the results of the treatments performed. The surgeon has less control of his or her own profession and is mainly left with the everyday care of the individual patient, which, of course, is of primary importance. However, the new rulers seem uninterested in such issues, as both patient care and treatment appear too complicated to measure or put a price on and are, therefore, also difficult to understand from an administrative perspective. In many instances, the original healthcare principles have been abandoned; consequently, the care of the individual patient seems no longer the primary goal of those with management power.

Taking care of emergency patients is not what it used to be. One typical example of guidelines from the past is: The majority of severe abdominal pains lasting 6 hours in previously well patients are of surgical importance. Today, however, abdominal pain may often be the result of psychosocial diseases, drug abuse, family violence, street trauma, imagination, or may be a way for people to get sick leave. In these situations, the position of the surgeon is obviously not that central any more, as the treatment of abdominal pain may involve psychiatrists, social workers, and other specialists before the surgeon is even consulted.

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Patients and their families place enormous demands on the results of surgery, as only successful results seem acceptable. Thus, any results that do not meet these expectations are held as futile or even as failures. This viewpoint may be an expression of new trends as many people are predominantly interested in the easy routes toward cure, and easy solutions without personal efforts are preferred. Supplement medicine, herbal remedies, and “happiness pills” fill the headlines of our media, and people seem willing to pay almost anything to keep up with the body image, “cosmesis,” of today. For instance, cosmetic surgery is performed mainly upon healthy individuals, who actually do not have a disease or objective abnormality.² This type of surgery is far afield from our firm belief that surgery is dedicated to curing diseases that cannot be treated with the same success in any other way.

Too Great a Workload?

The workload of the surgeon is enormous. Each and every operation must be well performed and the team must also be taught the surgical repertoire needed without neglecting the preoperative and postoperative treatment. To be a multidisciplinary team leader, the surgeon has to build a strong network of necessary teams in connection with his or her surgical activities, with team members representing anesthesiology, ICU, radiology, pathology, endoscopy, internal medicine, microbiology, and other areas of medicine.

In the past, the general surgeon was able to perform reasonably well in a vast field of operations. But mediocre results are not acceptable anymore. Specialization to a defined area of surgery enables us to be more skilled and achieve much better results than before. By concentrating on a narrow field of diseases and operations, we can perform better, and this focus also enables us to develop our selected area of surgery. Operations on the liver and the brain and congenital anomalies are good examples of areas which today have expanded and yield results unheard of 20 or 30 years ago. One should not forget the vast development of anesthesiology, ICU, and clinical pharmacology, which permit us to successfully operate on severely ill patients with multiple diseases.

New developments have to be implemented in surgical techniques, in the use of new devices and invasive nonsurgical interventions. Numerous companies spend large amounts of money in developing these new inventions, which then are offered as testing devices to the surgeons, although most will never replace the treatment panel in present use.³ At university hospitals, the responsibility for teaching and project planning for medical students is a duty and one that never works well without the active participation of the chief and the entire staff. Dynamic personal interactions between staff and the students have a positive influence in students' choice of a surgical career.⁴ It is vital that the residents understand their job and responsibility for the patients, who actually are in their hands during the different surgical procedures. In addition, it is necessary to have the whole staff participate in continuous education, as teaching and learning are the main paths to success for the surgical department. All of these areas have to function well; otherwise, a collapse of the surgical team is imminent.

Nowadays many of the young surgeons do not regard their profession as the main content of their lives. Much more than the present generation of professors and chairmen did, they value life outside the hospital and free time, family, hobbies, and travel are highly favored. However, at the same time, these future surgeons demand more attention in the form of teaching, personal tutorship, surgical praxis, and early access to major surgery. They want to spend less time on call and yet still earn a higher salary. All of these wishes cannot be fulfilled so we must find suitable solutions to every one of them. In this situation, we should remind ourselves that not all of the young people practicing classic music are destined to become maestros, and most will be content with a less demanding position in the orchestra.

One feature of immense importance in surgery is its nature of invasiveness, of breaking the patient's integrity, if a philosophical phrase may be used. No other specialty in medicine involves such a job feature. In this respect, life is much easier for those who are not surgeons. For us surgeons, invasive operations comprise a natural part of surgery, of which we all are aware. Those who are skilled usually do not contemplate much on the invasiveness, and some even regard it as a challenge. Coolness under fire has always been, and still is, one of the main qualities of an excellent surgeon. However, for some surgeons, the feature of invasiveness becomes a burden and a severe obstacle, so severe that it hampers everyday work. Such a surgeon should be identified by his or her colleagues; and if no solution is found to this problem, the person should not continue within surgery and should be advised of other fields in the medical profession.

When all goes well, the surgeons' self-esteem is on a high level. However, all of us make wrong decisions sometimes and we have to be able to withstand the consequences and learn from them. In 2005, Chan et al studied how physicians disclose medial errors to patients.⁵ Surgeons were actually rated highest on their ability to explain the medical facts about the errors. The study reports that 85% of the surgeons took responsibility for the error made, 80% explained facts of their errors, 57% validated patients' emotions, and 20% offered a second opinion. In my own opinion, these are not bad results for us surgeons, especially in the light of the fact that we are often criticized for not paying enough attention to informing and talking to our patients.

Another study, by Goldstone et al,⁶ examined aspects of fatigue with regard to surgical performance since it is often related to complications. The question was: Should surgeons take a break after the intraoperative death of a patient? The study group consisted of 233 succumbed patients and 932 matched control patients who had survived. Questionnaire results revealed no increase in total mortality in patients operated upon within 48 hours after death of the study patients. However, mortality did increase if the preceding intraoperative death had been in an emergency or a high-risk case. The study also reveals that the survivors stayed longer both in ICU and in the hospital.

Cultural Impacts on Surgical Practice

The glory of surgery is a distant memory when postoperative complications, however unavoidable they may be,

are dealt with by lawyers. Large sums of economic compensation may be promised to patients, but in most countries the actual amounts paid as compensation do not meet the expectations of the customer, who in this case is the patient or family. Regardless, this shame and blame culture in surgery should be taken seriously and should be met with the most effective weapons we have: teaching, training, and accuracy. Sir Alfred Cuschieri⁷ has suggested that since it is not possible to eliminate errors completely, we can improve surgical care by adopting error-tolerant systems based on progress in cognitive psychology, human factors, and human reliability assessment. These steps should enable detection, reporting, and targeted reduction of errors. Indeed, it has been maintained that a surgeon who cares can be safer.⁸

In addition to feeling overtaken by insurance companies and lawyers, another reason for the surgeon to feel bypassed in the medical world may be the level of surgical research. Assessed by impact factors (IF), the highest IF of a surgical journal (*Annals of Surgery*) in 2005 is 6.3, whereas the top journals of oncology, immunology and biochemistry, and molecular biology have IFs between 33.5 and 49.8.

But are there really reasons to be depressed about this? Understanding molecular biology is needed to a certain extent, but *who wants to be operated on by a surgeon with the main research published in nonclinical journals?* Second, many of the new observations obtained in basic research need to be confirmed in clinical settings to have an impact in the diagnosis and treatment of diseases, which are still our main tasks. Third, when the highest IF of a surgical journal is compared with top clinical journals in radiology, obstetrics and gynecology, anesthesiology, and pediatrics (IF, 4.2–5.8), surgery actually does rather well. This becomes even clearer when the IFs of the journals ranked number 20 in each specialty are compared; surgery competes well not only with those listed but also with journals in pathology, gastroenterology, and cardiovascular diseases.

One should also be aware of the fact that research and results in health care tend to be reported in quite low impact medical journals, as the really important reports of the ruling hospital administrations are published in financial and political journals.

The situation is not improved by the attitude of many surgeons to their own work. Why do so many surgeons underrate their own surgical achievements? Even after ending an exceptionally difficult and tedious operation, it is often announced that “this was nothing.” Thus, it is inevitable that, if we do not appreciate what we are doing, how can we expect others to do so?

Health authorities often point out that large geographic variations are seen in the frequency of different operations, particularly in private hospitals but in a high number of community-based hospitals as well, can be found both in national and international registries. This raises doubt about surgeons' abilities to select the optimal treatment in each case, since one should be able to refer the patient also to nonsurgical colleagues. Another negative example comes from my own specialty, which is transplantation. Stories of the buying and selling of organs, in particular in undeveloped

countries, continue to hit the headlines in the media throughout the world. Organs, most commonly a kidney or part of a liver, are generally taken from poor individuals and then sold to surgeons, who at a high price perform the transplantation upon a wealthy recipient.⁹ This “transplant tourism” has been condemned by all official transplantation associations, and the surgeons involved have been expelled from the transplant community. However, this kind of business medicine casts a dark shadow over the world of transplantation, and it also raises fear in the cadaver organ donor families, as they may wonder where the organs of their diseased family member have actually gone. Fortunately, all transplantations in the western world are documented and may at any time be checked by the national health authorities.

These 2 examples show that *we have surgeons whose own incomes are more important than the surgical outcome of their patients*. Business medicine is not only unethical, it reveals a fundamental deficit in the way of professional thinking of such surgeons. In the world of generalizations, it also casts a shadow on all surgical activities and it certainly affects the degree of appreciation from colleagues, patients, and the community.

Satisfaction

So how satisfied are surgeons with the job today? Burnout of surgeons has become a hot issue, and its causes have been studied recently.^{10,11} Imbalance between career and family is indeed a factor, but surgeons' lack of autonomy or involvement in decision making may also lead to burnout. Does the state of mind of surgeons influence the outcome of operations? This issue was studied in 1622 patients in 14 centers who were undergoing laparoscopic inguinal hernia repair.¹² Frustration of the surgeon was associated with a higher rate of postoperative complications and hernia recurrence, whereas satisfaction with the procedure did not correlate with outcome. Thus, stress on the surgeon counts even in minor surgery.

In 2005, the American Society of Transplant Surgeons presented a study of 209 surgeons which reported that, although 99% found transplantation rewarding, a high degree of emotional exhaustion was seen in 38%, depression in 27%, and low personal accomplishment in 16%.¹¹ How can this detrimental situation be handled or even changed? One answer was given later that year in a study presented at the Congress of the European Society of Organ Transplantation by its president, Professor Jan Lerut.¹³ He presented the results of an ESOT questionnaire on the “Attractiveness of the Transplant Surgeon: How to Make this Profession (again) Attractive.” Results of the questionnaire revealed that everyone wanted financial upgrading, 64% wanted career planning, 57% wished to have a larger surgical spectrum, 54% wanted more administrative help, and 33% wanted more flexible working time.

Job satisfaction was also evaluated in a recent single institution study.¹⁴ In this study, 114 general surgeons who had been residents 25 years back were contacted. Overall, 75% of the surgeons surveyed were satisfied with their practice/career, with a 20% voluntary or involuntary retire-

ment rate in those over 50 years of age. On the negative side, alcohol dependency occurred in 7% of surgeons.

The percentage of women is increasing among surgeons, and one may wonder how content they are with their profession. A national study on 187 women surgeons was carried out in Austria in 2004.¹⁵ On the whole, these women were satisfied with their profession and high satisfaction was reported among specialized surgeons, whose careers provided high activity and high operative volume. It is not surprising that the same activities are important for most surgeons, irrespective of their gender. Although male and female surgical residents perform equivalently as found in many types of measurements, female residents still underestimate their abilities, in particular, if they work in general surgery.¹⁶

One would imagine that the satisfaction of surgeons is influenced at least to some extent by the satisfaction of their spouses. A recent survey of 379 spouses of academic surgeons in 38 departments in the United States revealed that 81% of the spouses were satisfied with their situation.¹⁷

A database literature review on "Surgeons and Cognitive Processes" by Hall et al in 2003 showed that, although surgical image is one of action, it is evident that competent surgeons have cognitive traits that are held by all experts.¹⁸ The study concluded that it is important that surgeons do not become victims of their own cult image. I may add that a young resident who enters our department of surgery with burning eyes and a single-minded urge simply to operate is regarded as potentially dangerous and is not accepted as a resident in surgery.

Actually, the profile of a surgeon from the past seems to have changed in many ways according to a recent study, which showed no difference in temperament and character profiles between surgeons and anesthesiologists.¹⁹

In my own country, an inquiry has been made since 1971 at regular intervals in which adults are asked to name the most appreciated profession. People are given no less than 376 professions to choose from, and the result has every time been the same: the surgeon is on top of the list.

The occasional danger of burn-out should be identified and handled accordingly. Business medicine is a threat to the profession and should be evaluated by the profession itself in the near future. Surgical results should constantly be reviewed to show cost-effectiveness for the society and gained quality of life of our patients.

CONCLUSION

There are a lot of reasons for surgeons to continue the work with a high self-esteem. Not unexpectedly, the surgeon

who takes the profession seriously and continues to improve and use new treatments and technology seems to perform better and is more satisfied than those who do not. Surgical research compares well with that of other clinical specialties. Our leadership in multidisciplinary teams is undisputable in therapy modalities, where surgery plays a central role.

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